COMPARATIVE ADVANTAGE

SOURCES OF COMPARATIVE ADVANTAGE

- Investments in Technology
  - Investment in technology can increase productivity
- Relative Supply of Key Inputs
  - Nations may have more (or fewer) resources in one or more areas including:
    - Natural (land for farming, crude oil, natural gas, rivers for electriticy, etc)
    - Labor (skilled or unskilled)
    - Capital (factories or machines)
- Government Services/Regulations
  - Differences in education
  - Transportation/infrastructure development
  - Laws affecting contracts, safety, or environment

COMPARATIVE ADVANTAGE

- Answer 3 questions for EACH country:
  - 1. Are the goods exported mostly natural resource type goods, industrial/tech, or heavy mixture of both?
  - 2. Do the goods exported require low skilled labor, high skilled or a heavy mixture of both?
  - 3. Do the goods require little capital investment or a great deal of capital investment?

  - Take a guess as to which country you think each might be.

Country A

- Honduras
  - mix of ag/indus
  - low skilled
  - little capital

Country C

- India
  - mix, leaning natural
  - mostly unskilled
  - little capital

Country B

- Germany
  - Mostly industrial
  - fairly high skilled
  - great deal of capital

Country D

- Nigeria
  - mostly natural
  - low skilled
  - medium level of capital

ECONOMIC GROWTH

PRODUCTIVITY

- We measure productivity as the **relationship of inputs to outputs**
- For a business it's the cost of all their resources compared to their revenue
- For a country it's the cost of all of their resources as compared to their GROSS DOMESTIC PRODUCT (GDP)

WHICH BUSINESS IS MOST PRODUCTIVE?

	# of Workers	#of Tractors	Wheat Harvested
B1	200	25	2,000bales
B2	50	2	550bales
B3	100	5	1,250bales

WHICH BUSINESS IS MOST PRODUCTIVE?

- Assume labor is $80/person
- Each Tractor is $2,000
- A bale of Wheat sells for $15

WHICH BUSINESS IS MOST PRODUCTIVE?

- Business 1

Labor = $80 x 200 = $16,000

Tractors = $2000 x 25 = $50,000

TOTAL INPUT = $66,000

Revenue = $15 x 2,000 = $30,000

TOTAL OUTPUT = $30,000

NET LOSS = $36,000

WHICH BUSINESS IS MOST PRODUCTIVE?

- Business 2

Labor = $80 x 50 = $4,000

Tractors = $2,000 x 2 = $4,000

TOTAL INPUT = $8,000

Revenue = $15 x 550 = $8,250

TOTAL OUTPUT = $8,250

NET GAIN = $250

WHICH BUSINESS IS MOST PRODUCTIVE?

- Business 3

Labor = $80 x 100 = $8,000

Tractors = $2,000 x 5 = $10,000

TOTAL INPUT = $18,000

Revenue = $15 x 1,250 = $18,750

TOTAL OUTPUT = $18,750

NET GAIN = $750

TO SUMMARIZE

- Business 1 INPUT OUTPUT GAIN/LOSS

  66,000 30,000 -36,000

- Business 2 INPUT OUTPUT GAIN/LOSS

  8,000 8,250 250

- Business 3 INPUT OUTPUT GAIN/LOSS

  18,000 18,750 750

- Business **3** is MOST productive

IMPROVING PRODUCTIVITY

INVEST IN CAPITAL & TECHNOLOGY

- More factories, tools, machines, etc
- Faster machines, multi-tasking devices, machines with larger capacity

INVEST IN EDUCATION/TRAINING

- Train/educate workers
  - Specialization, new techniques, ability to USE technology
- Improve entrepreneurship
  - Better organization of resources, motivational tools, leadership, worker morale

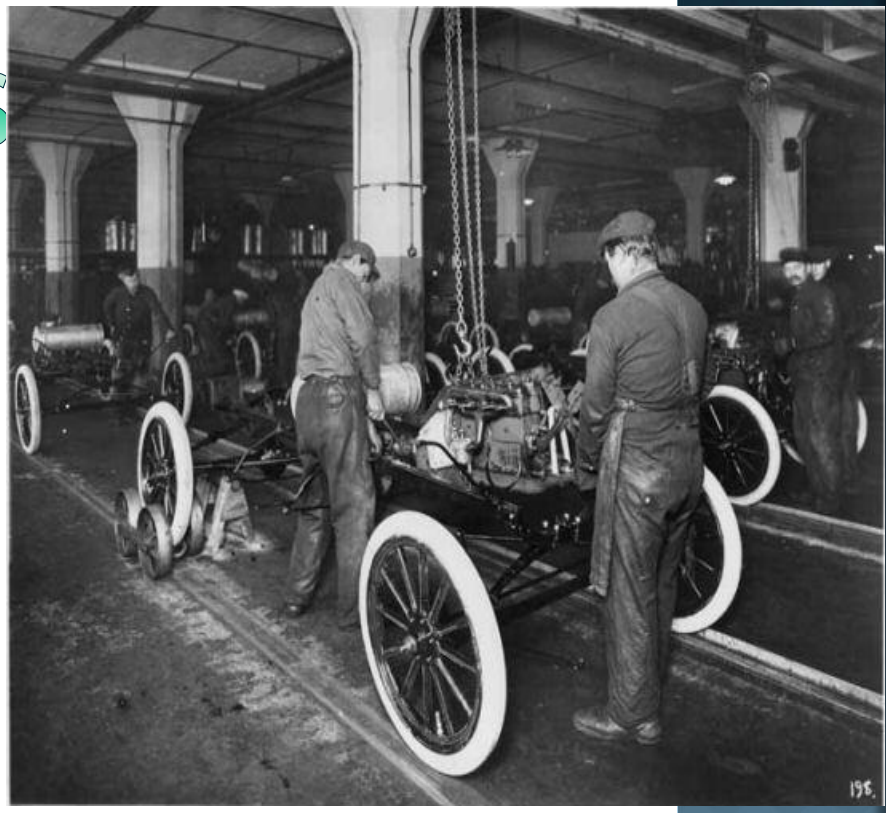
ECONOMIC GROWTH

- For countries, we look at economic growth in terms of **GROSS DOMESTIC PRODUCT** (GDP) and **GDP PER CAPITA**
- GDP = dollar amount of all goods and services produced in an economy
- GDP Per Capita = GDP divided by the population
- What makes an economy grow?

HISTORIC EXAMPLES

- Cotton Gin in America
  - Before Cotton Gin: 1 man = 1 pound of clean cotton
  - After Cotton Gin: 1 man = 50 pounds of clean cotton

HISTORIC EXAMPLES

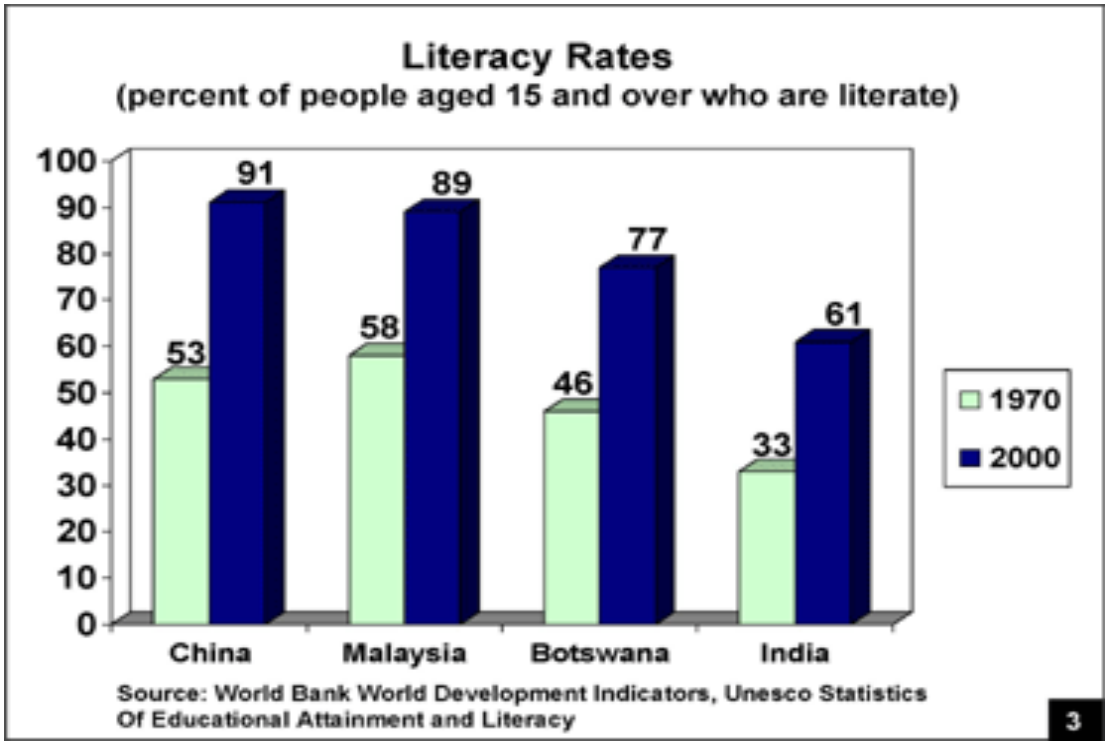


- Assembly Line
  - Before AL: .08 car frame in an hour (1913)
  - After AL: .67 car frame in an hour (1914)

HISTORIC EXAMPLES

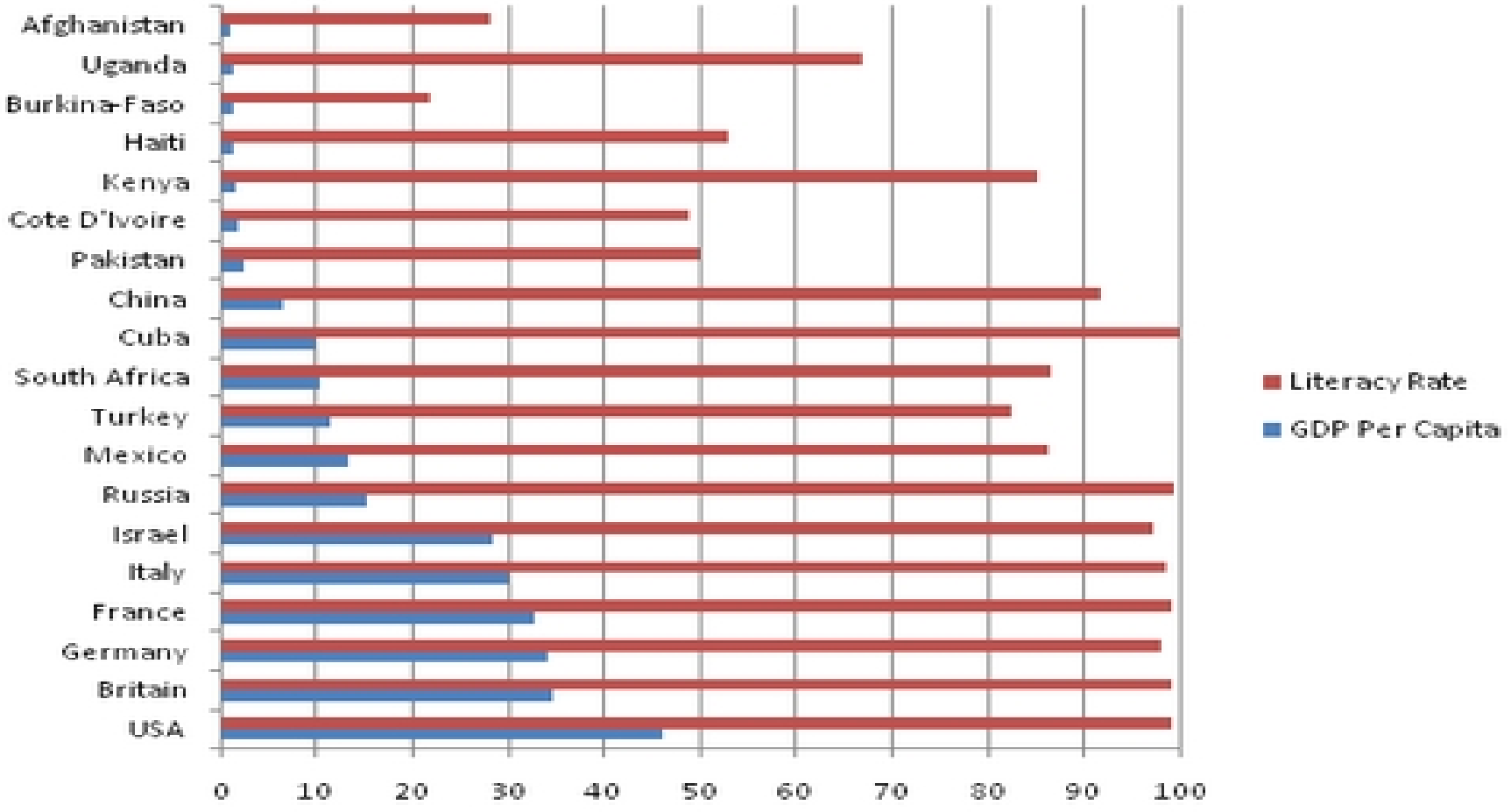
- Wheat Harvesting (Bushels in 1 hour)

1800	1900	2000
.26	.96	25



	GDP Per Capita 1970	GDP Per Capita 2000
China	$510	$1100
Malaysia	$1,171	$3,800
Botswana	$1,069	$3,203
India	$112	$447

GDP per Capita Compared to Overall Literacy Rate



LITERACY RATES

Country	Literacy Rate	GDP per capita
Bahamas	95.6%	$25,000
Australia	99%	$36,300
Bolivia	86%	$4,000
US	99%	$48,500
Sudan	61%	$2,200

RANK THESE COUNTRIES

- **Country A: Argentina**
- Population: 37,384,816
- PerCapita GDP: $12,900
- Literacy Rate: 96.2%

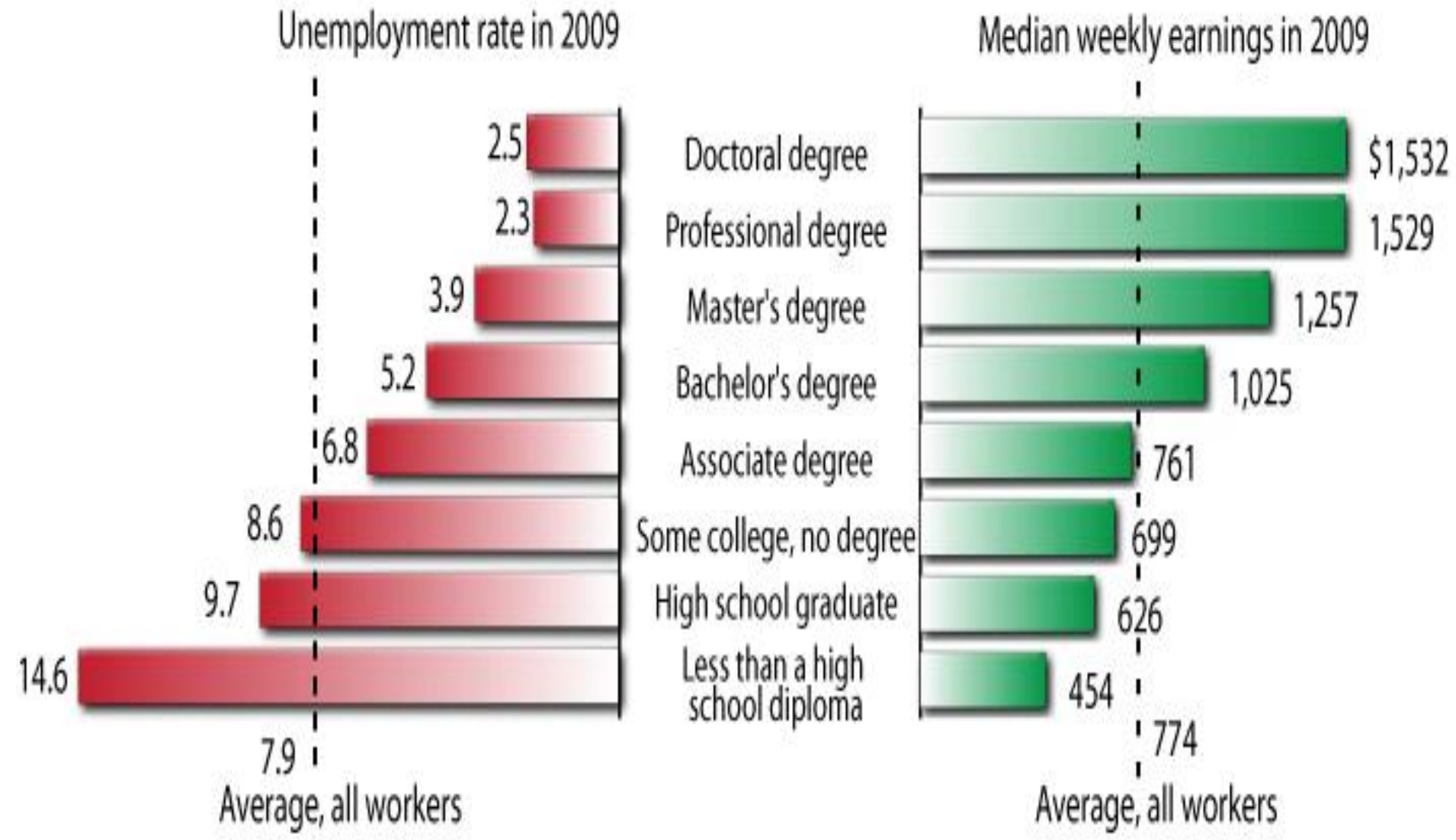
- Country B: Japan
- Population: 126,771,662
- PerCapita GDP: $24,900
- Literacy Rate: 99%

- Country C: Nigeria
- Population: 126,635,626
- PerCapita GDP: $950
- Literacy Rate: 57.1%

- Country D: Russia
- Population: 145,470,196
- PerCapita GDP: $7,700
- Literacy Rate: 98%

- Country E: Singapore
- Population: 4,300,419
- PerCapita GDP: $26,500
- Literacy Rate: 93.5%

Education pays

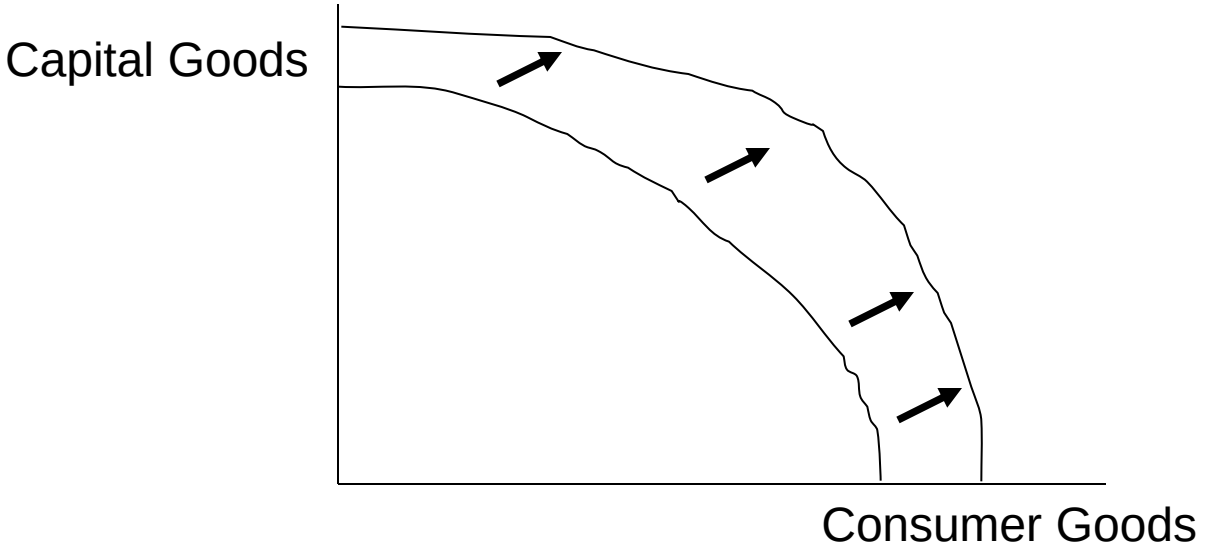


Source: Bureau of Labor Statistics, Current Population Survey

FACTORS AFFECTING ECONOMIC GROWTH

- High Investment in physical and human capital
- Greater economic freedom
  - lower taxes, fewer regulations, protecting property rights
- Strong Incentives to Save
- Competitive Markets
- Political Stability
- Free Trade

ECONOMIC GROWTH



- Not 1 magical thing, combination of several factors
- Increasing overall productivity is key